[028] Fig. 2 represents a schematic view of an additional preferred embodiment of a multi-step reduction gear of the invention [[and]];

[029] Fig. 3 represents a shifting diagram for the multi-step reduction gear of the invention in accordance with Fig. 1 and Fig. 2[[.]];

Fig. 4 is a diagrammatic view of an embodiment of the multi-step transmission having a differential;

Fig. 5 is a diagrammatic view of the multi-step transmission with a clutch element and a motor;

Fig. 6 is a diagrammatic view of the multi-step transmission located between a starting element and a motor;

Fig. 7 is a diagrammatic view of the multi-step transmission for a front-transverse installation with a motor;

Fig. 8 is a diagrammatic view of the multi-step transmission with a motor and a damper;

Fig. 9 is a diagrammatic view of the multi-step transmission with an auxiliary output for an additional unit;

Fig. 10 is a diagrammatic view of the multi-step transmission having a free wheel;

Fig. 11 is a diagrammatic view of the multi-step transmission with an electric machine;

Fig. 12 is a diagrammatic view of one of the shafts having a retarder; and

Fig. 13 is a diagrammatic view showing the input and the output on the same side of the transmission housing.

[039] In accordance with the invention, it is possible to provide ~~additional~~ a free wheel[[ings]] 42 at each suitable position of the multi-step reduction gear transmission, for example, to be connected between a shaft and the housing G, as shown in Fig. 10, or about two shafts if need be.

[040] Moreover, it is possible through the mode of construction of the invention to arrange the drive and the output shafts (1, 2), as shown in Fig. 13, on the

same side of the transmission or the housing preferably for transverse, frontal, longitudinal, back longitudinal or all wheel arrangements. Moreover, one of an axle differential and a distributor differential can be arranged on the drive side, or on the output side, as shown in Fig. 4.

[041] The drive shaft [[2]] 1 can be separated by a clutch element 24 from a drive motor 30, as needed, within the framework of an advantageous further development, as shown in Fig. 5, whereby a hydrodynamic converter, a hydraulic clutch, a dry starting clutch, a wet starting clutch, a magnetic powder clutch or a centrifugal force clutch can be used as the clutch elements. It is also possible to arrange a starting element 28 of this type behind the transmission in the flow of force direction whereby, in this case, the drive shaft 1 is continuously connected with the crankshaft 32 of the motor 30, as shown in Figs. 6 and 7. The start up can take place using a shifting element of the transmission. Preferably the brake 04, which is activated in the first forward gear, as well as in the first reverse gear, can be used as the starting element.

[042] The multi-step reduction gear of the invention enables the arrangement of a torsion vibration damper 34 between the motor 30 and the multi-step reduction gear transmission, as shown in Fig. 8.

[043] A wear-free brake 44, such as a hydraulic or electric retarder or the like, can be arranged on any shaft, preferably on the drive shaft 1 or the output shaft 2, as shown in Fig. 12, which is especially of significance for use in commercial motor vehicles within the framework of a further~~, not represented~~ embodiment. Furthermore, an auxiliary output can be provided preferably on the drive shaft 1 or the output shaft 2, as shown in Fig. 9, for driving an additional unit[[s]] 36 on each shaft.

[044] The shifting elements used can be constructed as load-shifting clutches or brakes. In particular, force-locking clutches or brakes such as disk clutches, strap brakes and/or cone clutches, can be used. Furthermore, form-locking brakes and/or clutches, such as synchronizations or claw clutches, can be used as the shifting elements.

[045] A further advantage of the multi-step reduction gear presented here consists in that an electric machine 40 can be installed on each shaft as a generator and/or as an additional drive machine, as shown in Fig. 11.